

**WHAT IS CLAIMED IS:**

- 1    1. A navigational system for a vehicle comprising an optical arrangement installed on at least one transparent viewing surface for a driver of the vehicle, said optical arrangement representing images displayed on said at least one viewing surface producing guiding images for imparting directions to the driver.
- 1    2. A navigational system as claimed in Claim 1, wherein said images comprise graphical representation pointing towards objects observed by the driver.
- 1    3. A navigational system as claimed in Claim 2, wherein said graphical representations comprise an image of at least one arrow display on said at least one viewing surface pointing towards a selected object for guiding the driver in a specified direction of travel.
- 1    4. A navigational system as claimed in Claim 3, wherein said at least one arrow is projected on said at least one viewing surface so as to be perceived in a 3-dimentional spatial image.
- 1    5. A navigational system as claimed in claim 1, wherein said at least one viewing surface comprises the windshield of an automotive vehicle.
- 1    6. A navigational system as claimed in Claim 1, wherein said at least one viewing surface comprises a side front window of an automotive vehicle.

1   7. A navigational system as claimed in Claim 1, wherein said at least  
2   one viewing surface comprises eyeglasses worn by the driver of the  
3   vehicle.

1   8. A navigational system as claimed in Claim 1, wherein said at least  
2   one viewing surface comprises lenses of said optical arrangement  
3   having at least one arrow provided thereon, said lenses having  
4   regulatable degrees of curvature and through which there are displayed  
5   objects located exteriorly of said vehicle, said lens curvatures  
6   facilitating the 3-dimensional spatial image perception.

1   9. A navigational system as claimed in Claim 1, wherein said system  
2   comprises means to assist drivers of the vehicle having reading  
3   disabilities and restrictions to read the names of objects and streets  
4   displayed on said at least one viewing surface.

1   10. A navigational system as claimed in Claim 1, wherein said system  
2   comprises means to assist drivers of the vehicle to recognize the colors  
3   of traffic lights as displayed on said at least one viewing surface.

1   11. A navigational system as claimed in Claim 3, wherein said system  
2   is in operative communications with a global positioning system (GPS)  
3   so as to impart information to the driver regarding objects observed on  
4   said at least one viewing surface and as indicated by the driver by  
5   pointing to the objects with pointing means.

1   12. A navigational system as claimed in Claim 11, wherein said  
2   pointing means comprise said at least one arrow.

1   13. A navigational system as claimed in Claim 11, wherein a computer  
2   is operatively connected to said system for operating said at least one

3      arrow; means for inputting information to said computer by said driver;  
4      said computer including means for analyzing said information displayed  
5      on said at least one viewing surface while communicating with said  
6      global positioning system, and imparting directional instructions to said  
7      driver in responsive to processing of said items of information.

1      14. A navigational system as claimed in Claim 13, wherein said  
2      information is inputted to said computer through a microphone in the  
3      form of verbal commands, and instructions received through a  
4      loudspeaker.

1      15. A navigational system as claimed in Claim 14, wherein said  
2      information is inputted to said computer through hand-written or  
3      keyboard-operated functions.

1      16. A navigational system as claimed in Claim 13, wherein said  
2      computer processes interrogations from said system regarding tasks  
3      including the reading of signs, determining colors and identifying  
4      objects, processing images related to specified tasks and providing  
5      answers to the driver responsive thereto which are displayed on said at  
6      least one viewing surface to assist the driver in directional guidance of  
7      the vehicle.

1      17. A navigational system as claimed in Claim 13, wherein control  
2      means for said system are installed on a driver steering wheel of said  
3      vehicle.

1      18. A navigational system as claimed in Claim 17, wherein said control  
2      means comprise a mouse which is mounted on the steering wheel.

1    19. A method for the navigation of a vehicle comprising installing an  
2    optical arrangement on at least one transparent viewing surface for a  
3    driver of the vehicle, said optical arrangement representing images  
4    displayed on said at least one viewing surface producing guiding  
5    images for imparting directions to the driver.

1    20. A navigation method as claimed in Claim 19, wherein said images  
2    comprise graphical representation pointing towards objects observed by  
3    the driver.

1    21. A navigation method as claimed in Claim 20, wherein said  
2    graphical representations comprise an image of at least one arrow  
3    display on said at least one viewing surface pointing towards a selected  
4    object for guiding the driver in a specified direction of travel.

1    22. A navigation method as claimed in Claim 21, wherein said at least  
2    one arrow is projected on said at least one viewing surface so as to be  
3    perceived in a 3-dimentional spatial image.

1    23. A navigation method as claimed in claim 19, wherein said at least  
2    one viewing surface comprises the windshield of an automotive vehicle.

1    24. A navigation method as claimed in Claim 19, wherein said at least  
2    one viewing surface comprises a side front window of an automotive  
3    vehicle.

1    25. A navigation method as claimed in Claim 19, wherein said at least  
2    one viewing surface comprises eyeglasses worn by the driver of the  
3    vehicle.

1    26. A navigation method as claimed in Claim 19, wherein said at least  
2    one viewing surface comprises lenses of said optical arrangement  
3    having at least one arrow provided thereon, said lenses having  
4    regulatable degrees of curvature and through which there are displayed  
5    objects located exteriorly of said vehicle, said lens curvatures  
6    facilitating the 3-dimensional spatial image perception.

1    27. A navigation system as claimed in Claim 19, wherein said system  
2    to assists drivers of the vehicle having reading disabilities and  
3    restrictions in reading the names of objects and streets displayed on  
4    said at least one viewing surface.

1    28. A navigation method as claimed in Claim 19, wherein said system  
2    comprises assisting drivers of the vehicle in recognizing the colors of  
3    traffic lights as displayed on said at least one viewing surface.

1    29. A navigation method as claimed in Claim 21, wherein said system  
2    is in operative communications with a global positioning system (GPS)  
3    so as to impart information to the driver regarding objects observed on  
4    said at least one viewing surface and as indicated by the driver by  
5    pointing to the objects with pointing means.

1    30. A navigation method as claimed in Claim 29, wherein said pointing  
2    means comprise said at least one arrow.

1    31. A navigational system as claimed in Claim 29, wherein a computer  
2    is operatively connected to said system for operating said at least one  
3    arrow; inputting information to said computer by said driver; said  
4    computer analyzing said information displayed on said at least one  
5    viewing surface while communicating with said global positioning

6 system, and imparting directional instructions to said driver in  
7 responsive to processing of said items of information.

1 32. A navigation method as claimed in Claim 31, wherein said  
2 information is inputted to said computer through a microphone in the  
3 form of verbal commands, and instructions received through a  
4 loudspeaker.

1 33. A navigation method as claimed in Claim 32, wherein said  
2 information is inputted to said computer through hand-written or  
3 keyboard-operated functions.

1 34. A navigation method as claimed in Claim 31, wherein said  
2 computer processes interrogations from said system regarding tasks  
3 including the reading of signs, determining colors and identifying  
4 objects, processing images related to specified tasks and providing  
5 answers to the driver responsive thereto which are displayed on said at  
6 least one viewing surface to assist the driver in directional guidance of  
7 the vehicle.

1 35. A navigation method as claimed in Claim 31, wherein a control for  
2 said system is installed on a driver steering wheel of said vehicle.

1 36. A navigation method as claimed in Claim 35, wherein said control  
2 comprises a mouse which is mounted on the steering wheel.